

Claims

- [c1] 1. A side airbag apparatus for a vehicle, comprising:
an airbag having a generally wedge shaped rear aspect
when deployed, the generally wedge shaped rear aspect
narrowing from an upper region to a lower region,
thereby inhibiting loading on the thorax of an occupant
of the vehicle seated adjacent the deployed airbag; and
an inflator cooperating with the airbag to supply gas
thereto, thereby facilitating deployment of the airbag.
- [c2] 2. The airbag apparatus of claim 1, wherein the airbag
has a side aspect including a generally wedge shaped
portion when the airbag is deployed, the generally wedge
shaped portion including a posterior edge, a top edge
extending forward from the posterior edge, and a bot-
tom edge, at least a portion of the bottom edge extend-
ing forward and upward from the posterior edge, thereby
further inhibiting loading on the thorax of an occupant
of the vehicle seated adjacent the deployed airbag.
- [c3] 3. The airbag apparatus of claim 1, wherein the airbag
has a generally wedge shaped top aspect when deployed,
the generally wedge shaped top aspect narrowing from a
posterior region to a front region.

- [c4] 4. The airbag apparatus of claim 1, wherein the airbag comprises a polymeric material of at least 600 denier.
- [c5] 5. The airbag apparatus of claim 1, wherein the inflator is configured to inflate the airbag to at least 25 pounds per square inch.
- [c6] 6. The airbag apparatus of claim 1, wherein the airbag includes a vent hole for venting gas from the airbag.
- [c7] 7. The airbag apparatus of claim 1, wherein the airbag includes a reinforced region for providing additional strength to the airbag.
- [c8] 8. An airbag apparatus for a vehicle, comprising:
an airbag having a generally wedge shaped rear aspect when deployed, the generally wedge shaped rear aspect narrowing from an upper region to a lower region, thereby inhibiting loading on the thorax of an occupant of the vehicle seated adjacent the deployed airbag, the airbag having a side aspect including first and second portions, the first portion being generally triangular and narrowing from a back region to a front region, thereby further inhibiting loading on the thorax of an occupant of the vehicle seated adjacent the deployed airbag, the second portion being contiguous with the first portion and including at least one mounting hole; and

an inflator configured for attachment to the airbag at the at least one mounting hole, and cooperating with the airbag to supply gas thereto, thereby facilitating deployment of the airbag.

- [c9] 9. The airbag apparatus of claim 8, wherein the airbag has a generally wedge shaped top aspect when deployed, the generally wedge shaped top aspect narrowing from a posterior region to the front region.
- [c10] 10. The airbag apparatus of claim 8, wherein the airbag comprises a polymeric material of at least 600 denier.
- [c11] 11. The airbag apparatus of claim 8, wherein the inflator is configured to inflate the airbag to at least 25 pounds per square inch.
- [c12] 12. The airbag apparatus of claim 8, wherein the airbag includes a vent hole for venting gas from the airbag.
- [c13] 13. A vehicle seat including a side airbag apparatus, the airbag apparatus comprising:
 - an airbag having a generally wedge shaped rear aspect when deployed, the generally wedge shaped rear aspect narrowing from an upper region to a lower region, thereby inhibiting loading on the thorax of an occupant of the vehicle seated adjacent the deployed airbag; and
 - an inflator mounted on a portion of the seat and cooper-

ating with the airbag to supply gas thereto, thereby facilitating deployment of the airbag.

- [c14] 14. The vehicle seat of claim 13, wherein the airbag has a side aspect including a generally wedge shaped portion when the airbag is deployed, the generally wedge shaped portion including a posterior edge, a top edge extending forward from the posterior edge, and a bottom edge, at least a portion of the bottom edge extending forward and upward from the posterior edge, thereby further inhibiting loading on the thorax of an occupant of the vehicle seated adjacent the deployed airbag.
- [c15] 15. The vehicle seat of claim 14, wherein the side aspect of the airbag includes first and second portions, the first portion being generally triangular and narrowing from a back region to a front region, the second portion being contiguous with the first portion and including at least one mounting hole for attaching the airbag to the inflator.
- [c16] 16. The vehicle seat of claim 13, wherein the airbag comprises a polymeric material of at least 600 denier.
- [c17] 17. The vehicle seat of claim 13, wherein the inflator is configured to inflate the airbag to at least 25 pounds per square inch.

- [c18] 18. The vehicle seat of claim 13, wherein the airbag includes a vent hole for venting gas from the airbag.
- [c19] 19. The vehicle seat of claim 13, wherein the airbag has a generally wedge shaped top aspect when deployed, the generally wedge shaped top aspect narrowing from a posterior region to a front region.
- [c20] 20. The vehicle seat of claim 19, including a longitudinal seat axis, wherein the top aspect of the deployed airbag defines an airbag axis, and the inflator is mounted on a portion of the seat such that the airbag axis forms an angle of less than 30° with the longitudinal seat axis.